digital

# DECset-620
## Newspaper Typesetting System

DECset is a multi-task computerized newspaper typesetting system which provides the combined capabilities of four systems...

- A storage and edit system with:
  - on-line editing using video display terminals (VDTs).
  - off-line editing using both paper tape and optical character recognition (OCR) equipment.
- A complete classified ad system with on-line editing.
- A complete on-line and off-line wire service system including stripping, storage and editing.
- A production management system which produces:
  - continuous copy flow through each stage of production.
  - continuously updated file information and production statistics.
  - classified billing information.

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# DECset-620 AND THE NEWSPAPER BUSINESS

DECset is a cost-effective typesetting system. It continuously processes inputs from perforator operators, typists, proofreaders, editors and wire service equipment. At the same time, the system sends stories to line printers, punches, and on-line photocomp machines. Any system user can initiate and control an operation related to a specific task independently of other users. The system automatically records each operation and schedules it on a user-defined priority basis. This not only relieves the production manager of the scheduling burden, but also results in more efficient, accurate scheduling.

Digital Equipment Corporation has worked closely with newspaper management and their personnel for many years. Our Graphic Arts programming staff understands the need for reliable software that can get a newspaper out on time. They also recognize the importance of hyphenation accuracy, kerning, small caps, ligatures, ragged copy, runarounds, typeface variety, logos, PI characters and speciality work. The DECset software reflects this knowledge and experience.

## DECset-620 AND ITS MAJOR BENEFITS

These are among the major benefits that the DECset system brings to newspaper publishing:

- Easily-learned command language with simplified and defined commands saves markup time.
- Formats and automatic makeup features save page makeup and copyfitting time.
- Interactive VDTs' make editing, proofing and correcting fast and simple.
- Precomposition editing problems disappear.
- Photomechanical paper consumption is reduced.
- Paper tape editor handles ganged corrections.
- Operator statistics and story directory are maintained and updated automatically.
- Totally automatic, high-capacity classified ad system optionally produces transient and contract ad billing data for DIGITAL's standard advertising business system.

### DECset-620 ALSO FEATURES...

DIGITAL's newest, state-of-the-art hardware technology. The heart of the system is the PDP-8/a processor. It operates as the system traffic center, co-ordinating terminal requests such as sorting and dumping classified ads and storing and retrieving information on the disks.

Up to four of DIGITAL's new RL01 disk drives may be added to the DECset system, bringing the total on-line storage capacity to 14 million text characters.

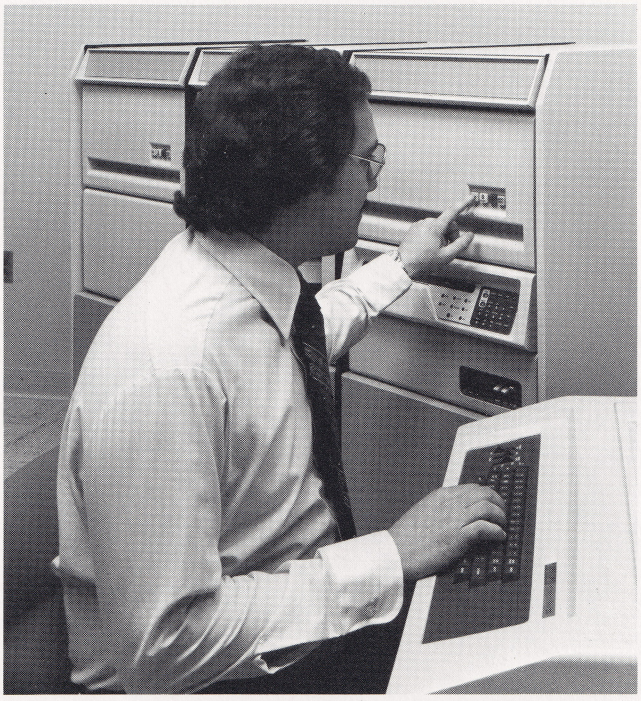
The new VT72/t video display terminal includes 16 user-definable keys (that may each have 2 unique definitions), a split-screen capability for comparing and merging copy, and many other easy-to-use features. Built into each VT72 terminal is an LSI-11 programmable microprocessor capable of scrolling through up to 35,000 characters.

### PLUS THESE GROWTH FEATURES...

- Expansion and growth to multiple VDTs' and multiple systems.
- Off-line news service wire stripping.
- Expansion to DECwire–DIGITAL's on-line wire service storage system.
- Typesetting applications business systems available.

### AND THE SECURITY OF...

- State-of-the-art hardware and software.
- DIGITAL's total system support.



## DECset-620 AND THE PROGRAMS THAT MAKE IT WORK

These are the major programs that operate the DECset system:

- Paper tape editor
- Monitor/executive program for both manual and automatic production control and management
- Photocomp driver program:
  - justifies and hyphenates text
  - handles complex displays
  - handles text processing
- Statistics and management report generator
- Exception-word dictionary editor for on-site modification to maximize hyphenation accuracy
- Format editor
- Command definition editor
- Auxiliary programs for copying disk packs and DECtapes
- DECset ad storage

## PAPER TAPE EDITOR

The paper tape editor supplied with the DECset system is an efficient, easy-to-use word editor designed to minimize the time required to correct copy after it has been proofed. Corrections are ganged together in an edit tape, which is then passed against the original story file. Only the words or lines that contain errors are corrected. After the copy is corrected, the entire story is re-justified and re-hyphenated and a clean, up-to-date file is produced and stored, ready for typesetting.

### SOME PAPER TAPE EDITOR FEATURES...

- Simplified commands for deleting, inserting or changing a single word, several words, a single line or several lines.
- Start and stop at any word on any line.
- Print only correction lines in proof.
- Multiple edit commands for combining stories, abstracting or extracting lead paragraphs.
- Flagged correction lines for easy identification.
- Block-move commands for rearranging copy.

## MONITOR/EXECUTIVE PROGRAM

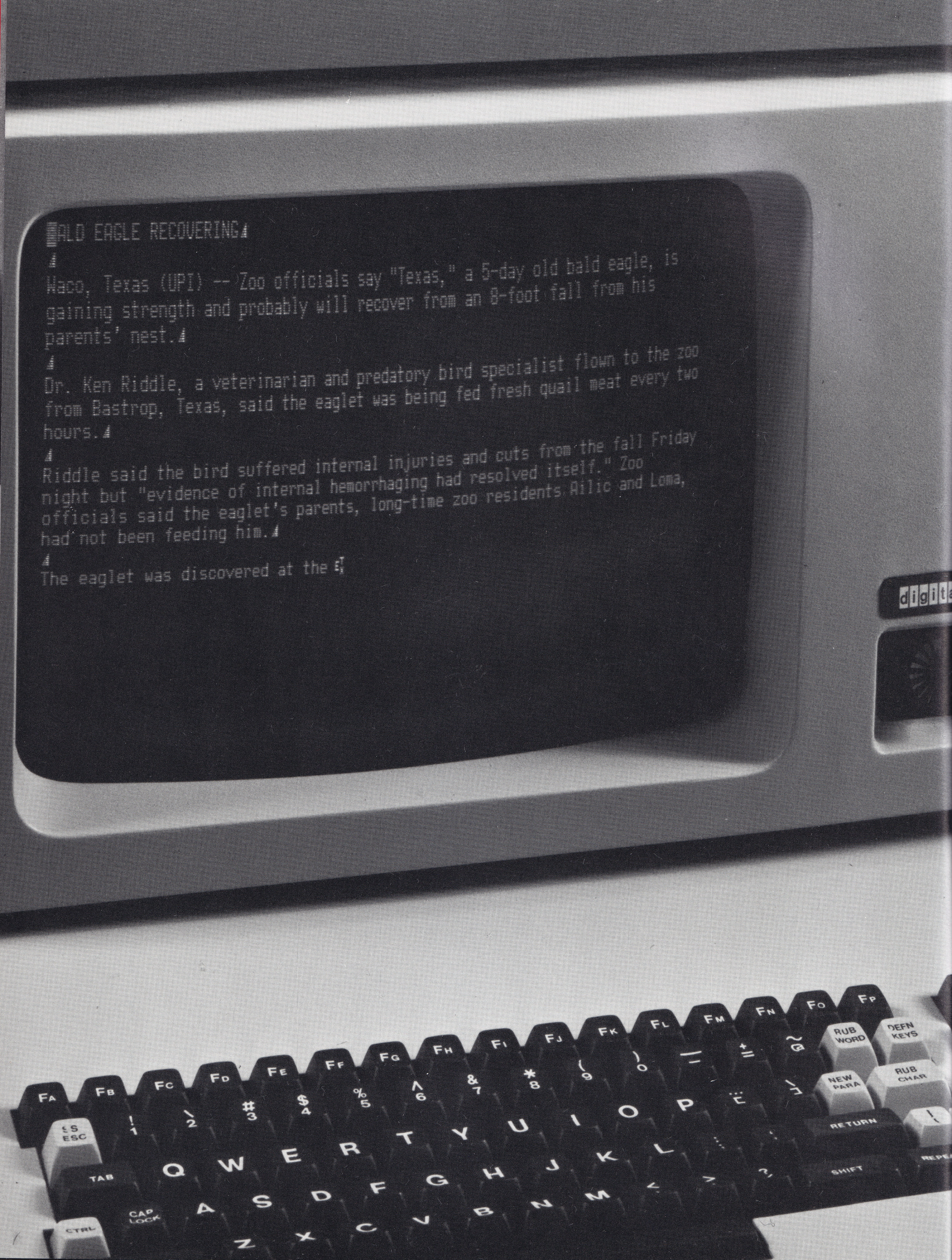
Editors and perforator operators have complete control of every story in the DECset system at each stage of production. They can direct any story to the line printer for proofs or to the punches or to the on-line phototypesetter for finals. They can also save stored files in paper tape for transfer to another system or to the morgue, and they can retrieve story files from paper tape for reactivation. And, they can combine several stories or ads in a single take.

The Monitor/Executive Program also allows the production manager to override the commands of the editors and perforator operators. Thus the decision to print or final any story file or files can be made at any stage of production. Using the Monitor/Executive Program, the production manager can monitor the operators and zero the operator statistics; he can quickly check a story by requesting a line printer proof.

A convenient queue command, which can be issued from either the console or the editing terminal, lists the current status of the system, giving the production manager an immediate, up-to-date report of the system load on the paper tape readers, paper tape punches and the line printers. Through this report, every story file can be tracked right up to deadline.

### FEATURES OF THE MONITOR/EXECUTIVE PROGRAM

- Queued proofs, finals, and kills for automatic and manual production management.
- Complete file priority control.
- Classified ad storage and retrieval.
- File protection.
- Operator statistics and story file directory.
- Stored files saved on paper tape.
- Multiple takes from optical character readers and paper tape readers.
- Direct output of finalized stories with manual kill or auto-kill (optional).


BALD EAGLE RECOVERING
Waco, Texas (UPI) -- Zoo officials say "Texas," a 5-day old bald eagle, is gaining strength and probably will recover from an 8-foot fall from his parents' nest.
Dr. Ken Riddle, a veterinarian and predatory bird specialist flown to the zoo from Bastrop, Texas, said the eaglet was being fed fresh quail meat every two hours.
Riddle said the bird suffered internal injuries and cuts from the fall Friday night but "evidence of internal hemorrhaging had resolved itself." Zoo officials said the eaglet's parents, long-time zoo residents Ailic and Loma, had not been feeding him.
The eaglet was discovered at the
digit
RUB WORD
DEFN KEYS
NEW PARA
RUB CHAR
RETURN
SHIFT
TAB
CAP LOCK
CTRL
ESC

# COPY MARKUP AND KEYBOARDING

Complete typesetting and composition capabilities are available to markup personnel with the DECset Photocomp Driver Program–a program developed through experience to simplify markup and keyboarding by giving the production department the commands needed to do the job. Commands are included for vertical justification, column makeup, reverse leading, copy-fit corner cut ads, area makeup, tabular copy, dual formats and other important features.

No special skills are required to keyboard marked-up copy. The typists type exactly what they see, using standard 6-level TTS* keyboards or 8-level keyboards with single-stroke function keys for frequently-used commands to maximize system use and design features.

Markup personnel assign typeface, point size, leading and column measure with standard or user-defined codes or function keys, depending on the keyboard in use.

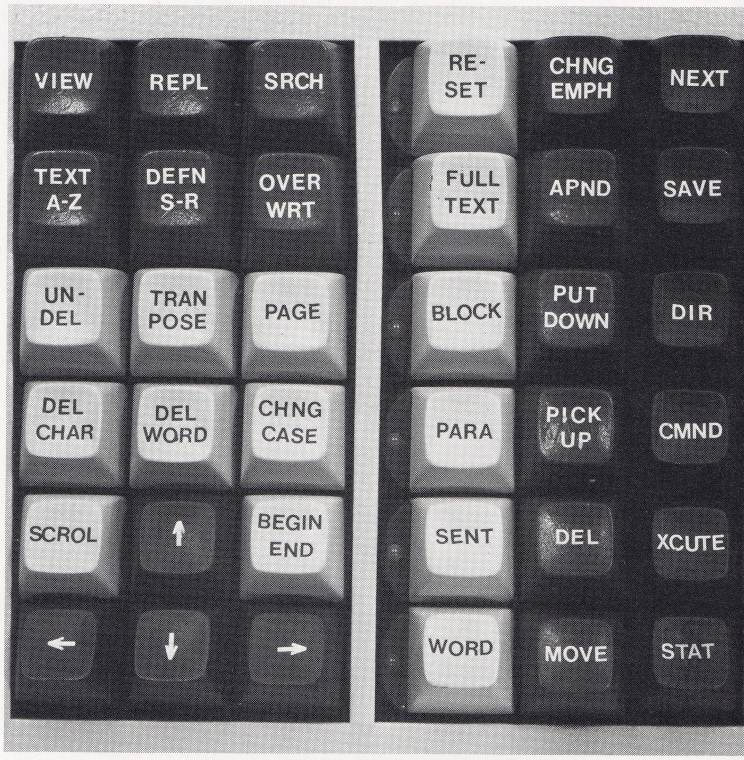
For repetitive copy, markup personnel prepare formats, which the keyboarders use in place of the composition commands. Formats further reduce markup and keyboarding time and enable display ads and other complex copy to be handled easily.

For complex copy that has many random changes of typeface and size, markup personnel use the DECset dual-format feature.

Typing from the marked-up copy, the keyboarders switch quickly between the call strings of two different formats using a single keystroke.

Formatting makes the typist's job simpler and easier and lets the DECset system run at the speed for which it was designed.

The justification and hyphenation program automatically determines proper word breaks and line endings. Hyphenation is determined by an exception word dictionary and the logical rules of hyphenation. The most frequently occurring English words are always hyphenated correctly. The exception word dictionary can be edited easily on-site and the logical rules of hyphenation can be overridden for any story. The results can be checked on a line printer proof or a video display and editing terminal.




## FEATURES OF THE PHOTOCOMP DRIVER PROGRAM . . .

- User-defined commands
- User-defined formats
- Vertical justification
- Automatic column makeup
- Automatic ad and galley makeup
- Automatic ligatures
- User-controlled hyphenation & spacing
- PI characters from window or disk
- Visual messages for proofreaders and photocomp machine monitor (off-line machines only)
- Tabular commands
- User-defined foreign language hyphenation and exception word dictionaries
- Single-column page makeup
- Multi-column page makeup
- Automatic headline point size selection
- Dual formats

*TTS is a registered trademark of Fairchild Corp.

## STATISTICS AND MANAGEMENT REPORTS

Complete statistical information by file number and operator is always available to the production manager. Statistics are printed by file number. The manager has the option of printing statistics for all file groups or any one group. Totals are kept for individual stories, group subtotals and grand totals. This is some of the information included in a statistics report:

- Version number
- Processing time (J & H time), or create time, or version time
- Current line count
- Current file depth in picas and points
- Final status
- Final time
- Operator number
- Original line count
- Original keystrokes, edit keystrokes, alternate keystrokes, and total keystrokes
- Number of VDT accesses
- First line of the file, or a user-defined number of characters

All file information for a particular group appears on a separate page of the report. Abbreviated statistics are shown with the individual file's line printer proof and are displayed on the editing terminal. Statistics are also printed by operator number, including all keystroke counts per operator and grand totals for all operators.

The report also contains the hours and minutes of idle time, providing constant monitoring of the system load. Mass storage space remaining to the system is available on request.

## DECset-620 WIRE STRIPPER

DECset handles all ANPA/RI standard TTS wire service tapes (AP, UPI, etc.) The wire tapes can be read through the paper tape reader, re-justified to predefined parameters and stored in the DECset system under the appropriate wire classification. At this time, the story is automatically sent to the line printer. Once in storage, the wire stories appear as any other file and the appropriate statistical information is accumulated. The stories can be edited or sent to the phototypesetting device via an interface or through paper tape output.

## DECset-620 SYSTEM OPTIONS

These are some of the options available with the DECset system:

- DECset classified ad storage system
- VDT editing software module
- Multiple inputs and outputs for more efficient system operation. Copy can be input from paper tape readers or optical character readers simultaneously. It can also be output to paper tape punches or on-line photocomp machines simultaneously.
- Automatic program swapping for multiple photocomp drivers
- DECwire,on-line wire service storage
- Foreign hyphenation:
  - French
  - German
  - Spanish
  - Italian
  - Dutch
- Archival storage on floppy disk, disk cartridge, DECtape or industry-compatible magtape
- Classified advertising billing

# DECset-620 CLASSIFIED AD STORAGE

The capacity of the DECset classified ad storage option is sufficient to handle the classified ads of typical suburban cities and towns. And the capacity can grow as the business of the advertising department grows. The basic system uses an inexpensive disk pack that stores a 24-page, solid-set classified section. The capacity may be increased by adding additional disk cartridge units.

The system handles all the details of transient ads that are encountered in the everyday race to the deadline. It also services the important business accounts and contract advertising which are the life of the newspaper. Reports–estimated classified edition size reports, dump reports, automatic kill reports, manual kill reports, reactivated ad reports, skip key modification reports and ad directory reports–are generated daily, helping production personnel and ad takers to do their jobs more efficiently and accurately.

DECset Ad Storage produces a completely new classified section every day. New ads are stored in the DECset data base until they are proofed and corrected. Only error-free ads are sorted into the Ad Storage data base, yet they can always be returned to the DECset terminal and edited or modified–perhaps to make a slightly different ad, or change a price, or modify insertion dates or even kill the ad before schedule expiration; anything to accommodate a customer. Damaged galleys can be replaced immediately simply by requesting the system to re-dump several ads, a complete classification, or several classifications.

## DECset-620 AD STORAGE FEATURES

These are some of the features of the DECset ad storage option:

- 24 pages of solid-set classified per disk
- Automatic handling of up to 12 editions
- Automatic kills
- Variable dormancy period by classification
- Transient billing with pre-printed forms, credit checking and financial reports, including:
  - credit risk reports
  - ad renewal lists
  - invoices or statements
  - cash applications
  - aged credit reports
  - bogus phone numbers
- Dump in background–single ad, multiple ads, single classification, multiple classifications or complete classified section
- Dump to paper tape or on-line photocomposers
- Stored ad editing–access by phone number or ad number
- Variable sorting by classification
- Dormancy definable by individual classification
- Alteration of all run, sort, skip, and edition keys without text accessing
- Exact classification or edition size information by inches and tenths

SECURITY GUARDS
WANTED
HELP WANTED
200%
PAPER SALE
VT241

## VIDEO DISPLAY EDITING AND PROOFING

Editing and proofing are independent of DECset, so the main computer isn't tied up needlessly. The edit cycle starts when an operator requests a file. The computer responds by sending the requested text directly to the terminal. The line endings displayed on the screen are exactly the same as the proof copy that is output on the line printer.

## THE VT72/t AND THE MANAGING EDITOR

A wide variety of editorial and administrative tasks that must be performed by the managing editor can be handled from the VT72/t.

The VT72/t, with its own built-in microprocessor, is a fast-reacting, upper-and-lower-case, intelligent video terminal that performs complex editing tasks.

Both compact and quiet, the VT72/t can move vast amounts of copy through the newspaper's editorial, classified, and production departments. This saves a great deal of footwork and manual intervention.

While the managing editor is performing administrative tasks, reporters, editors, production, and advertising personnel can all work in their own system areas at their own speeds.

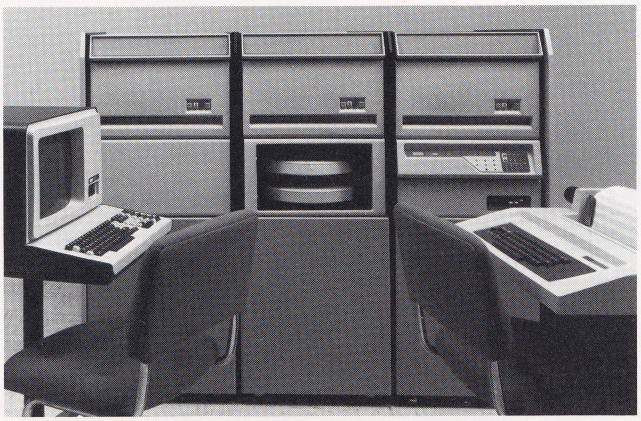
The VT72/t keyboard consists of a function keypad and a standard typewriter keyset with some additional special-purpose keys–including 32 user-definable keys. With a single keystroke, a user-defined key performs such operations as:

- Assign different text formats designed by the user.
- Recall standard, pretyped paragraphs, avoiding duplication of effort.
- Execute commonly used story and routing commands.

Panned scrolling allows easy scanning of moving copy in the same smooth manner one would encounter on home television. The variable speed vertical movement of the screen image permits continuous viewing of an entire story.

The split-screen feature permits a user to conveniently work with two stories at the same time.

Command keys, special function keys and a clearly visible cursor enable the user to create, edit, store, and prepare copy for output to a photocomposition machine. As with panned scrolling, the user can vary the movement speed of the cursor.



## THE VT72/t AND THE NEWS EDITOR

Stories need to be abstracted, rearranged, combined, corrected, and rewritten. These are some of the tasks that can be easily performed:

- Insert, delete, or move words, lines, sentences, paragraphs, or blocks of text. Overstrike characters or words.
- Search for and change a specific character, word, or group of words that recur within a story.
- Move or repeat lines, paragraphs, or blocks of text anywhere within a story.
- Embed messages, instructions, or notes in a story for future action or review.

The VT72/t has many new editing capabilities that are of great value to the news editor:

- Blocks of copy can be called to the terminal so that–using the split-screen feature–the best of two stories (perhaps from AP and UPI) can be merged into a third story.
- A large memory capacity (35,000 characters maximum) allows review and editing of lengthy stories.
- Users can define any number of contiguous characters (from one character to an entire story) when working on a specific segment of text.
- 16 user-definable keys, each with two unique definitions, can be used to execute commands, recall standard pretyped copy, assign text formats, etc.
- Five text display modes: normal, boldface, blank, and reverse video including any combination of these modes.
- Cursor speed can be controlled for editing and review at a pace comfortable for the user.
- An UN DEL key restores the most recently deleted character, word, or text block to the screen.
- A single keystroke corrects transposed characters.
- One key is used to change capital letters to lower case and vice versa.
- A single key enables the user to "step through" a story one page at a time.

## SUPPORT AND SERVICE

Almost as important as your DECset system are the services which support it. DIGITAL's field service organization has engineers at offices throughout the world. Services range from single- and multi-shift coverage through a local office to resident service in which the engineer is located right at the customer's site.

Field offices also provide software specialists to handle service calls and arrange for on-site customer training. Formal software and applications training is available to every DECset customer through DIGITAL's Educational Services Department. Schedules are available from any DIGITAL office for training courses offered in DIGITAL's regional training centers or in the main training facility in Maynard, Massachusetts.

## THESE ARE SOME OF THE THINGS YOU CAN COUNT ON WITH YOUR DECset-620 SYSTEM

- System analysis and design
- Modular growth capabilities
- Programming
- Hardware design
- System integration
- Installation
- On-site training
- Local maintenance
- System service
- Documentation

GRAPHIC ARTS GROUP

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